

Fish Use of Stream Drainage Basins in the City of Bellevue

April 2009

Background and Data Sources

Current knowledge of the species of fish in Bellevue's streams and their distribution is based on stream typing work conducted in the summer of 2001 (The Watershed Company 2001) that involved assessing culverts as to whether fish could pass upstream and electrofishing; an electrofishing survey conducted at five sites in the Kelsey Creek basin in 2007 (City of Bellevue, unpublished data) and fish moved prior to sediment removal from two sediment ponds along Coal Creek (The Watershed Company 2007a); salmon spawning surveys conducted annually during the fall between 2001 and 2008 (Taylor Associates 2002; The Watershed Company 2003, 2004, 2005, 2006, 2007b, 2009); and peamouth surveys and spawning observations conducted by Bellevue staff and volunteers between the late 1990s and 2008 (City of Bellevue, unpublished data). Lake Washington shore use by warm water fish was documented by Washington Department of Fish and Wildlife in June of 2005 (Personal Communication, Chad Jackson, July 18, 2007). Fish use of the lake shore along Lake Sammamish has not been documented by the City of Bellevue.

Sturtevant Creek Basin

Sturtevant Creek (08-0260) is one of the most urbanized basins in Bellevue, and includes portions of downtown Bellevue and I-405. Its headwaters are at Lake Bellevue, and it flows into Mercer Slough. The downstream segment is the least altered reach. Coho, chinook, and sockeye salmon and peamouth use are documented in the City's historical records. In addition, coho were known to use the entire stream in 1975 (Williams et al.). However, anadromous fish use is now blocked by the culvert at I-405.

In 2001, the middle reach was accessed via NE 2nd Place. This segment supported substantial flow, which was presumably stormwater runoff, since the upstream segment was barely flowing. No fish were found in this segment. The headwater segment near Lake Bellevue contained almost no water. The channel was muddy with a thick organic layer near the lake, and flow gradually weakened on its way downstream adjacent to the railroad tracks. Although no fish were found, Lake Bellevue was known to support a population of non-native goldfish (*Carassius auratus*). Thus, incidental fish use downstream of Lake Bellevue could be expected.

See Bellevue's Basin Fact Sheet main web page for additional fish use information for Bellevue streams.

References Cited

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